



# **LPI Report: Lunar & Planetary Science Conference and IDEA Initiative**

June 22, 2022

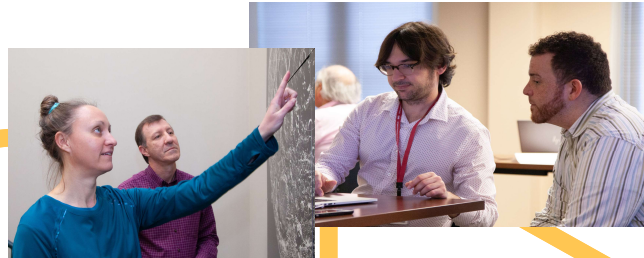
Lisa Gaddis  
Director, LPI

# LPI Serving the Planetary Community and the Public

## Science Team & Scientific Research



**Library & RPIF**



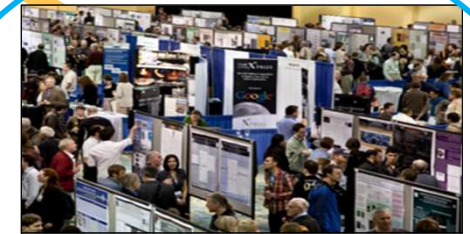
**Communications**



**Summer Intern Programs**



**Science Engagement**



**Conferences and Meetings**

# LPI-JSC connection

Located in Houston, Texas, LPI was established in 1968 to support and maintain a close working relationship with **NASA's Johnson Space Center (JSC)**, especially the Astromaterials Research & Exploration Science (ARES) Division

## Activities include:

- **Joint leadership of LPSC conference**
- Joint postdocs and visiting scientists
- Sample training workshops
- Research collaborations
- Exploration collaborations
- Flight operations training
- Support for astronaut field training
- Joint direction of LPI/JSC Summer Intern program





# LPI Operations & Context

## LPI is Not a Business or a Professional Association

- Managed by the Universities Space Research Association (USRA), a non-profit
  - Jamie Shumbera at the LPI runs USRA Meeting Planning Services with 4 staff members
- Located in Houston, TX (“Space City USA”) since 1968, just north of NASA’s Johnson Space Center
- Funded by NASA Planetary Sciences Division (PSD) through a Cooperative Agreement to provide support to planetary science community
  - For Meeting Services: abstracts, programs, web sites, announcements, other logistics
  - LPSC Program Committee, jointly chaired by LPI and JSC
- Event expenses are funded through registration fees
  - Venue rental, AV, captioning, WiFi, food and beverages, COVID-19 expenses, etc.
- *All meetings must be cost-effective to NASA, with reasonable registration fees*
  - *We may not be able to support all possible meeting services & requests*

## Community Input on LPSC & LPI Program

- LPSC Program Committee focuses on meeting content and session programming
  - LPSC Program Committee Chairs: Walter Kiefer (LPI), Justin Filiberto (JSC)
  - Conference Chairs: LPI Director (Lisa Gaddis) and ARES Division Chief (Eileen Stansbery)
- All meetings request feedback via an attendee survey
  - 8-12 questions, ranked scores and comments
- Annual meeting of the LPI Science Council
  - Dr. Jessica Sunshine (Chair), 7 others
- Starting in 2020, we convened a LPSC Advisory Committee
  - 5 to 6 members, met 2x in 2020, 4x in 2021
- Starting in 2021, an LPI IDEA Advisory Committee has been convened
- Plus social media!

## Venue Selection: Timing

- LPSC and similar large, complex conferences
  - 3 to 4+ years in advance of the conference date, depending on the requirements
  - Using venues repeatedly (assuming they meet all requirements) increases negotiation power which can lead to concessions and discounts
    - LPSC has been held at The Marriott / Waterway Woodlands since 2009 and the community benefits from this history
  - Rigorous schedule of event planning and announcements Sept to March
  - **Much more complex for hybrid! Effectively two meetings at once**
    - Especially during a pandemic
- Smaller meetings and workshops
  - 9 months to 1+ year in advance of the meeting/workshop date, depending on the requirements

## Future of LPI-Hosted Meetings

- Pandemic in 2020 caused us to cancel LPSC 2020 entirely
  - But, we supported a talk series for early career scientists (so they wouldn't miss out)
- We moved to virtual meeting planning in 2020
  - Rapid response needed, learning curve on tools with quickly changing capabilities
  - We had the opportunity to see what worked and what didn't at a few meetings
  - Straightforward with available tools, less expensive (reasonable default option as needed)
  - Delayed abstract deadline one week in response to community need
  - *First fully virtual LPSC event was held in March 2021*
- LPSC Adv Comm and our polling results indicated strong interest in **returning to in-person events, including LPSC 2022**
- **Hybrid meeting planning continues in 2022+**
  - Planning many hybrid events, monitoring COVID-19 incidence curve
  - Continuing to incorporate current technology (apps, virtual tools) to support science presentations and interaction, inclusion
  - Increasing networking opportunities (e.g., early-career mentoring, jobs, student positions) for those who are unable to, uncomfortable with or prefer not to attend in person
  - Adding public engagement events to make the science more accessible

# LPSC 2022

- Hybrid event

- Held at The Woodlands, TX March 7 to 11, 2022
- Attendee safety was a primary concern, so we implemented a COVID-19 Safety Plan
  - Required vaccination (validated through a vendor), masking, distancing; Signage reminders; Mitigation plan
  - Spacing of chairs, posters, etc. (promoted safety and improved accessibility)
  - Simplified and distanced badge pick-up
  - *Attendees were agreeable and supportive of these steps*
- ~2050 registrations (third highest total), 47% in-person, 52% virtual
- Student registrations were 34% of total (consistent with previous years)
- Incorporated current technology (Zoom for Govt, vFairs, Slack, Padlet, Gather.town, live captioning, iPosters, etc.) to support science presentations and interaction, inclusion
- Provided networking opportunities (e.g., early-career mentoring, jobs, student positions) for those who are unable to, uncomfortable with or preferred not to attend in person
- **Lesson Learned: Hybrid events are more expensive (two parallel meetings in one), so more \$**



# LPSC 2022

- For 2021 and 2022, no in-person peripheral meetings
  - Avoided gathering in small spaces
  - Greatly simplified the meeting logistics
  - All meetings were virtual (as in 2021), self-organized (as in pre-COVID years and 2021), and self-advertised using the Padlet app on the LPSC website (as in 2021)
- Planning for safety, accessibility, inclusion, equity
  - Posted safety information for attendees
  - Conversations with local law enforcement and township management
  - Live captioning for many sessions
  - Use of personal names, pronouns on badges (implemented via USRA Meeting Portal)
- **Continuing best practices**
  - Provided link on the LPSC website to the venue's accessibility efforts
  - Family room (implemented in 2015)
  - Bulletin board for attendees to coordinate combined housing shared rides, childcare, etc. (implemented prior to 2014)

# LPSC 2022

- **Continuing best practices (more examples)**
  - Assigned gender-neutral restrooms (implemented in 2018)
  - Updated Code of Conduct ([www.lpi.usra.edu/code-of-conduct/#](http://www.lpi.usra.edu/code-of-conduct/#))
  - Provided reasonable accommodations for Americans with Disabilities Act (ADA)-qualifying needs
    - Individualized based on qualifying need
    - Examples (from 2022 and prior years)
      - Oral/poster session accommodations for mobility disabilities – configured session rooms with wide aisles for wheelchair accessibility and marked reserved seats and/or open spaces
      - Accommodations for hearing disabilities – work with identified attendees and their organizations to arrange for sign language interpreters
  - Improved intellectual property information on the website (implemented in 2021)
  - Added links to information/pages for URC Groups & Programs in Planetary Science and STEM (see <https://www.lpi.usra.edu/idea/>)
  - Supporting Cross-AG IDEA Working Group web site (<https://www.lpi.usra.edu/idea/working-group/>)

# LPSC 2022 – A Success!

## • Social media buzz: sharing science

**Paul Byrne** @ThePlanetaryGuy · Mar 7  
I'm heading home from #LPSC2022 with a spring in my step.

We had a "full day" of Venus talks for the first time in years, decades even. Our community is growing. We have some amazing science on the way.

This is a helluva time to explore.



**Martin Hajovsky** @MartinHajovsky · Mar 11  
Echoing others, I just want to say a hearty thank you to everyone who presented work at #LPSC2022. I remain continually impressed with every one of you, and the work you do. Never doubt that your work changes how we view our solar system/galactic/universal home. Y'all rock!



**Dr. Gwénaél Caravaca** @GCC\_Mars · 19h  
Awesome virtual poster session at #LPSC2022 😊 for once a virtual meeting that is both practical and cheerful 🥳  
Thanks all for dropping by and sorry to those I missed, now I go 🏃  
@SpaceWicca @jcwrt @cirquelar @eleniravanis @timgoudge #mars2020

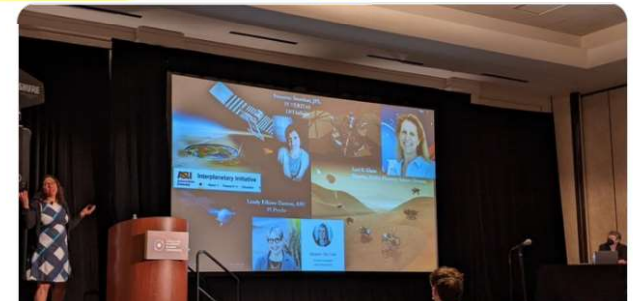


**Aisha Khatib** @lunar\_quakes · Mar 11  
first in-person #LPSC2022 was one for the books. thankful to @umdgeology and all the great people I met throughout the week!



2 39

**Dr. Ryan Watkins** @Ryan\_N\_Watkins · Mar 7  
Best Masursky lecture ever. #LPSC2022



**Libby Tunney** @libby\_tunney · 18h  
Really enjoyed wandering around gather.town for #LPSC2022 iPoster session. Had a virtual gathering with a couple people in my lab group (Alex Sheen and @LunarPatrick) to appreciate the dance function 🥳 Thank you to those that stopped by!

**Astromaterials Data System (AstroMat)** @AstromatData  
Lots of great discussion happening now at final #LPSC2022 poster session. Heading to the lunar sample and meteorite posters. #astromaterials [hou.usra.edu/meetings/lpsc2022](https://hou.usra.edu/meetings/lpsc2022)...



**LUNAR AND PLANETARY INSTITUTE**



# LPSC 2022 – A Success!

## • Social media buzz: conference organization and effectiveness



**Dr. Ryan Watkins** @Ryan\_N\_Watkins · Mar 9

I just want to pause at the halfway mark of [#LPSC2022](#) to give a big shout-out to [@LPitoday](#) - while there are the usual occasional bugs, the hybrid nature of this meeting seems to be going fantastically. Great job!



**Bob Pappalardo** @RPappalardo · Mar 8

The [#LPSC2022](#) organizers have figured out how to do a hybrid meeting very well. At group Q&A, following a set of four talks, remote presenters are "in the room," participating equitably.



**David A Williams (he/him/his)** @davidaw222 · Mar 9

Added another food truck for [#LPSC2022](#) today. I had the crawfish etouffee and shrimp creole and they were 🤤🤤🤤



**Jennifer Mays** @jennlmays · Mar 11

Had a blast microtweeting lunar and meteorite science this week at [#LPSC2022](#)!



**Astromaterials Data System (AstroMat)** @AstromatData · Mar 11

Closing out [#LPSC2022](#) with this fun announcement! Thanks to all the fabulous presenters and [@LPitoday](#) for hosting an outstanding meeting this week. [@jennlmays](#) [twitter.com/LPitoday/statu...](#)



**Martin Hajovsky** ✓ @MartinHajovsky · Mar 7

Nice new Q&A format at [#LPSC2022](#) this year is to give four talks, then bring up all four presenters for a combined panel Q&A. At this [#LPSCMoon](#) session, two are here and two are streaming in from offsite. Fascinating opportunity for collaborative discussions.



**Natsumi Noda** @\_n\_nuts · Mar 8

I found [#LPSC2022](#) is the best hybrid international conference I've attended. I can tune in to multiple ballrooms from home (without running room to room) and also review them later. Super intensive and exciting.

# LPSC 2022 – A Success!

## • Social media buzz: IDEA



**Justin Filiberto** 🌈 🧑🏻 @PlanetaryRocks · Mar 12

I was so inspired by the IDEA session at #LPSC2022 with a FULL room of people wanting to learn! It gives me hope for the future. We need to keep the momentum up to build a more inclusive planetary science community. I cannot wait for #IDEACon [hou.usra.edu/meetings/advan...](https://hou.usra.edu/meetings/advan...)



**Dr. Ed Rivera-Valentín** 🇪🇸 🇵🇷 @PlanetTreky · Mar 11

I was touched and thrilled by the great turn out for the first IDEA oral session at #LPSC2022! I hope we can continue the commitment for #IDEAcon. And most importantly, I hope we as a community commit to being advocates for the oppressed and excluded.

[Show this thread](#)



**Aisha Khatib** @lunar\_quakes · Mar 8

glad to see the room so full during the special session for inclusivity diversity equity and accessibility at #LPSC2022



**L. Miché Aaron #BLM** @Astrenome · Mar 8

Currently at the "Advancing Inclusion, Diversity, Equity, and Accessibility in the Planetary Workforce" session.

"We don't need more studies to prove this. What we need now is action."

I'm so glad the speaker said this!

#LPSCIDEA  
#LPSC2022



**Megan Broussard** @CosmicMeganB · Mar 11

I had a great time at my first #LPSC2022 highlights were presenting a poster on meteorites in weather radar, Dr. Martha Gilmore's lecture, the IDEA session, and hearing about all the amazing science going on in planetary science!





# LPSC 2022 – A Success!

- Our favorite!



Dr. Kirby Runyon  
@nasaman58

Meetings organized by @USRAedu and @LPItoday should be THE MODEL for all other scientific (and other) meetings. The website ease-of-use, coordination, abstract submission process, hybrid participation, etc., is nearly perfect.

8:35 AM · Mar 11, 2022 · Twitter Web App

See also the Photo Gallery for lots of fun images!

<https://www.flickr.com/photos/lunarandplanetaryinstitute/collections/72157720483137214/>



## LPSC 2023 @ The Woodlands, TX (1 of 3)

- Given the long lead time needed, we have scheduled LPSC 2023 in The Woodlands, TX

### Rationale:

- We continue to live in extraordinary times. **The pandemic is not over yet**, and may not be over by March 2023. The safety of our in-person meeting attendees is of paramount importance. Having successfully implemented LPSC 2022 at The Woodlands and having developed a working plan at that venue to ensure safety from COVID-19, we would prefer to remain at that same venue location in 2023.
- The balance of attendance between in-person and virtual is uncertain while the pandemic goes on. In-person attendance trends continue to show approximately 50% of pre-pandemic in-person attendance rates. Assuming this trend continues into early 2023, the Marriott in **The Woodlands offers the perfect amount of space**.
- **Familiarity of The Woodlands venue was immensely popular in March 2022**. We heard from many, many attendees that they were delighted to be back at that location, where they felt safe, event parking is accessible and free, lots of safe hotel choices, van rides were available, nearby restaurants and groceries, food trucks were provided, etc.

## LPSC 2023 @ The Woodlands, TX (2 of 3)

### Rationale:

- The Woodlands is in proximity to both the LPI and NASA JSC, and there are **cost benefits in reduced travel for both groups of conveners** at a time when air travel costs are rising. This helps to hold down registration fees for all participants.
- NASA personnel from other centers and HQ, as well as members of the community, travel to JSC when attending LPSC, which **reduces NASA's overall costs**. These visits include using research laboratories, discussing and selecting curated samples, and discussing infrastructure and future planning.
- Venue costs have risen in recent years. We have a well-established relationship with The Woodlands Marriott, and we have received substantial reductions in cost (i.e., cost savings) based on that relationship. **These cost savings are passed on directly to attendees** in the form of lower registration fees.

## LPSC 2023 @ The Woodlands, TX (3 of 3)

### Rationale:

- The current LPI Cooperative Agreement with NASA ends in 2023. Each time we manage the LPSC, we incur cost risks. Moving the LPSC to an unfamiliar facility at the end of the LPI CA is **deemed too risky**, especially as the pandemic continues.
- For individuals who cannot or will not travel to Houston, **LPSC 2023 will be offered in a hybrid format** to permit virtual participation. While the hybrid format is more complex and expensive, it supports meeting participants with a wide variety of needs, attending from their tailored worksites at locations across the globe.
- Use of a well-known event location allows us to pursue the possibility of **other community requests**, such as offering food trucks, childcare, etc. [But while the pandemic continues, offering childcare may not be advisable.]
- We periodically review the LPSC venue (including consideration of moving LPSC to other locations) and **we welcome input on this from the LPSC community**. For LPSC 2023, The Woodlands venue remains a cost-effective and popular option.



# LPSC 2021: IDEA Initiative



## Inclusion, Diversity, Equity and Accessibility: IDEA @ LPI

- **Listening to and learning from our community** to identify and address biases, racism, and exclusionary practices; support underrepresented groups; and promote accessibility
- **Assessing our practices** to remove barriers to inclusion at the LPI and throughout our professional sphere
- **Strengthening our own internal training** in these areas, learning from our peers, and bringing in IDEA experts to expand our understanding through invited speakers, seminars, and discussions
- Made **changes to the USRA Meeting Portal** to ensure that our use of your identity (e.g., names and personal gender pronouns) is inclusive, respectful, and consistent with our IDEA policy and best practices
- Creating an **independent advisory committee** to examine our past practices and guide us to improve our support of the community going forward
- Fostering **new community workshops** and discussions on IDEA topics (e.g., working closely with other NASA-sponsored working groups and scientific and technical professional societies) to promote best practices in IDEA in the planetary sciences
- LPI IDEA website: <https://www.lpi.usra.edu/idea/>



# IDEA at LPI: Ongoing Activities

- **Assessing our practices** to remove barriers to inclusion at the LPI and throughout our professional sphere
  - USRA DEI Committee (3 people from LPI)
  - NSF “URGE” Pod in 2021 at LPI & USRA (USRA-funded)
  - Monthly reporting on LPI, USRA and community DEI activities at LPI Team Forum
  - Modifying recruiting, hiring practices to support **inclusive hiring**
  - Seeking funds to support URC in STEM (SciAct ReaCH, TEAM II)
  - Cross-Advisory Group IDEA Working Group (~3 people from LPI), etc. (DPS+)
  - Supporting IDEA practices and activities at LPSC/meetings, community
- **Strengthening our own internal training**, learning from our peers, and bringing in IDEA experts to expand our understanding through invited speakers, seminars, and discussions
  - Internal discussion series and training
    - Braving Diversity (e.g., microaggressions, identity, cultural sensitivity)
    - See Shupla et al, 2022:  
<https://www.hou.usra.edu/meetings/lpsc2022/pdf/2159.pdf>
  - External staff training on topics like bystander intervention



From Academy to Innovate HR,  
<https://www.aihr.com/blog/inclusive-hiring/>

# LPSC 2021: Events for Underrepresented Communities (URC)

## Women in Planetary Science (WiPS)

- Started informally in ~2003(?), more formally in 2008
- Became the WiPS Networking Event in 2009 (and named for Susan Niebur in 2012+), recent organizers Sarah Noble (NASA HQ) and Mallory Kinczyk (APL)
- Hosted event/luncheon at LPSC since ~2009(?)
- Funded variously by NASA PSD, DPS, etc.
- Gathering, networking, guest speakers, guided discussions (advertised by the LPI)

## Queers in Planetary Science (QUIPS)

- Started in 2017 at LPSC
- Held off-site during LPSC (advertised by LPI if known)
- LPSC 2021: LGBTQ+ Gather.town Networking Space
  - Networking events plus roundtable discussion on professional development

## Planetary Scientists of Color (PSoC)

- Started in 2019 at LPSC
- Held off-site during LPSC (advertised by LPI)
- LPSC 2021: PSoC Gather.town Networking Space (self-organized)
  - Networking events plus private meeting rooms

**LPI/LPSC Role:** Advertising, sometimes meeting space

**See links & information here:**

- <https://www.lpi.usra.edu/idea/>

- <https://www.lpi.usra.edu/idea/working-group/> (expansion underway by WG)

# LPSC 2022: First IDEA Session

## Special Session at LPSC 2022

- “*Advancing IDEA in the Planetary Workforce,*” March 2022
- A non-science oral session, and a first for this kind of special session at LPSC
- Acknowledged that inclusion is a core value of NASA
- Convened diversity experts, planetary scientists, NASA managers to discuss what is happening and what is needed to support IDEA in our community
- Discussed tangible steps for advancing IDEA in the planetary workforce over the next decade
- LPI IDEA website: <https://www.lpi.usra.edu/idea/>

Stuart Robbins @DrAstroStu · Mar 8  
We are putting up the #NASA logo-based rainbow #LBGTQ pins on the #LPSC2022 announcement board, feel free to take one. Let me know if they're gone, I'll put out more. These were funded via a Kickstarter in 2019.



James Tuttle Keane @jtuttlekeane  
Since everyone's asking: we'll be giving out these #NASApride pins at forthcoming planetary conferences (DPS, AGU, LPSC)—for free! #Pride 🏳️‍🌈 #LBGTQ #STEM (1/4)



# LPI 2022: Advancing IDEA Conference (#IDEAcon)

## Community Workshop

- **Advancing IDEA in Planetary Science, April 25-29 2022 (virtual)**
- Science Organizing Committee (SOC)
  - E. Rivera-Valentín, K. Lynch, J. Filiberto, J. Piatek, J. Rathbun, D. Trang, J. Vertesi
- Leveraging community momentum to help ensure that the planetary science community can take giant leaps to advance IDEA principles in the workforce over the next decade
- Convened diversity experts, planetary scientists, NASA managers to discuss what is happening and what is needed to support IDEA
- No registration fee
- Professional fees for keynote speakers
- Structure:
  - 4 keynote talks from experts outside of planetary science
  - Invited speakers, Contributed presentations (**look for recordings!**)
  - Workshops & Special Sessions
    - Designing and Sustaining Authentic Partnerships
    - Proposal Writing Workshop, Dr. Christina Richey
    - Listening Session
  - Working sessions, report writing
- Website: <https://www.hou.usra.edu/meetings/advancingidea2022/>

**LPI Role: Organizing,  
hosting, paying professional fees**

*Today's presentation by  
Rivera-Valentín*



# LPI 2022+: Working with IDEA Advisory Committee

- Reviewed plans for LPSC 2022 in January 2022
  - Report issued January 2022, response returned April 2022
- Commented on: LPI action, 2022; LPI action, 2023+
  - Accessibility at LPSC
  - WiFi bandwidth
  - Indigenous land acknowledgements
  - Support for URM groups at LPSC
  - Training in biases, inclusion for LPSC programming committee
  - IDEA prioritization vs science
  - Code of Conduct updates
  - Demographic data collection
  - LPSC location
- Presentation:
  - Vander Kaaden et al., 2022: <https://www.hou.usra.edu/meetings/advancingidea2022/pdf/2017.pdf>
- Website: <https://www.lpi.usra.edu/idea/advisory-committee/>
- Next review later this year



# LPI 2022+: IDEA Next Steps

- USRA's Meeting Portal is a critical part of the LPI's support of meetings, conferences, and workshops
  - All abstracts collected are archived in a searchable database
  - Retain digital collection of all LPSC (1978 to present) and LSC (1971–1977) abstracts
  - All abstract data is shared with NASA's Astrophysics Data System (ADS) for accessibility worldwide to research scientists
- Ongoing continuous improvement efforts
  - Implemented internal and community review processes to ensure quality of online products
  - Sent emails to the entire community, explaining the updates and encouraging profile reviews
  - Included message in all meetings-related email communications to update profile information
  - **Participants manage their own profile information**
    - Authors are asked to update profile information, review and communicate corrections

## Meeting Portal Updates

We have modified the meeting portal to follow best practices that support inclusion, diversity, equity, and accessibility. We encourage you to log into the meeting portal before the conference to update your profile information. From the meeting portal home page, click on Edit Profile to get started.



# LPI 2022+: IDEA Next Steps

- Updates to the USRA Meeting Portal user interface ongoing
- To be released later in CY22



## Sign in or Sign Up

Email

Password

**SIGN IN**

[? Forget your password?](#) [+ Create an Account](#) [> Third Party Payers](#)